

Interdisciplinary Instrumentation Colloquium

Superconducting Insertion Devices for the Next Generation of Synchrotron Radiation Sources

Speaker: Soren Prestemon
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Date: Wednesday, July 26, 2006

Time: 4:00 PM sharp

Place: LBNL, Building 50 Auditorium
(directions at <http://InstrumentationColloquium.LBL.gov>)

Superconducting insertion devices have a long and varied history, intimately connected to the development of synchrotron radiation sources. I will track the development of superconducting insertion devices over the last three decades, discussing performance and implementation issues of some example devices and the role they played in the progress of synchrotron radiation sources.

Superconducting undulators in particular have received renewed attention in the last few years, and are poised to begin service in the next generation of synchrotron radiation sources. I discuss the motivation for the new interest, the potential performance characteristics of superconducting undulators, and outline technical issues that have been or are currently being investigated. Future technical hurdles anticipated with application to free electron lasers and the International Linear Collider are discussed.

Presentations (pdf files) and dates of future colloquia are posted at
<http://InstrumentationColloquium.LBL.gov>

Suggestions for speakers and topics are welcome. Please contact
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